SENATE			
PUBLIC HEALTH	, WELFAR	E & S	SAFETY
Exhibit No	6		
Date	- 4	A	2015

Chairman Thomas and members of the Committee my name is Jim Carlson, I my the supervising sanitarian for the Missoula City-County Health Dept. On behalf of Montana Environmental Health Association, the Association of Mt. Public Health Officials and the County and City of Missoula we stand in strong opposition to HB 245.

Public Health is the science of preventing disease through organized public effort. The prevention of disease through cost effective measures such as immunizations and food and water sanitation, including pasteurization, are always much, much less expensive than treating disease on an individual basis. Through prevention individuals do not experience many diseases. As public health public servants we would be negligent if we did not oppose this bill because it poses unacceptable and avoidable risk to the public. AMPHO and MEHA have been active in supporting changes in law that lessen red tape where the risk to the public is minimal. A good example is our support of this session's Cottage Food Bill. However we cannot support HB 245 of the basis of serious health risk especially to young children.

This bill as introduced was a high risk to the public's health. As amended by the House it is unacceptable. If you look at line 15 page one the original bill provides for a small herd exemption from pasteurization that allows a herd of 7 cows or 15 goats or sheep to be tested for brucellosis and tuberculosis. It also requires on pages two and three that the milk be cooled to 45 degrees within 2 hours and that the raw milk be tested four times in a six month period for total bacteria at 15,000 per ml, coliform bacteria at 25 per ml, and somatic cells of 500,000 per ml for cows.

In the House the bill was amended to make another avenue to sell raw milk. This avenue is much riskier and totally unregulated. On page 2 lines 20 & 21 the new amendment says,

"(5) (A) A PERSON WHO SELLS SHARES IN A HERD IS NOT SUBJECT TO THE PROVISIONS OF THIS SECTION IF THE OWNER OF A HERD SHARE OBTAINS FOR HUMAN CONSUMPTION RAW MILK FROM THAT HERD."

This means that a person who sells herd shares does not have to register or test for total bacteria, or test for coliform or for somatic cells or test the animals for brucellosis or tuberculosis.

On lines 22 through 26 of page two the qualification for herd share exemption is described. The theory here is that the herd share owners own the cow and can therefore drink their own milk. There is nothing in Montana law right now that prevents a person who owns a cow or goat from consuming the milk. But the herd share language in the bill is not specific and would allow anyone to sell a share for a minimal charge so that the milk can be sold to consumers without regulation.

So why do public health officials universally oppose raw milk sales as too risky? Although milk is a perfect chemical mixture to support young mammals it also provides a perfect media to grow bacteria many of which are harmless but some are pathogenic or disease causing. Top pathogens implicated in raw milk outbreaks in the United States include:

Campylobacter is a bacteria that causes diarrhea frequently with bloody stool, fever nausea, vomiting, occasionally convulsions and about 100 deaths per year in the US. Cattle and poultry feces are the most common source of this disease.

E. coli O157:H7 is a gut bacteria that produces a toxin that causes a bloody stool that may be mild but is often nearly all blood, it often causes kidney failure known as hemolytic uremic syndrome in children. Of the children that develop HUS 50% percent require dialysis and 5% die. The reservoir for 0157 is livestock. Based on studies, two to ten percent of dairy cattle shed E. coli 0157 in their feces even though the cow is immune to the bacteria.

Salmonella causes diarrhea, vomiting, dehydration, and often hospitalization for children and the elderly. Cattle, poultry, swine, birds and reptiles are the reservoir for this disease.

Listeria is a bacterium with symptoms range from mild to fatal often causing preterm delivery or fetal death in pregnant women. Forage, soil, livestock food and silage are the reservoir for this disease.

From a risk perspective it is important to know that that the rectum of the cow is close to and directly above the back of the udder. Gravity, a swollen udder and the tail often conspire to cause the aft portions of the udder to be heavily contaminated with fecal matter. If the animal is carrying a pathogen it is nearly impossible to prevent some contamination of the milk, even where the milking parlor is most modern and sanitation procedures are perfect.

The good news is that pasteurization, heating milk to 161 degrees F. for fifteen seconds, will deactivate all of the pathogens I have described and others I have not, such as tuberculosis and brucellosis. Pasteurization temperature is 62 degrees above normal body temperature and 62 degrees below boiling.

Truth in advertising. Please note that on page 4 lines 2 through 5 the label requirements for raw milk that is sold through the small herd qualification reads

"THIS PRODUCT, SOLD FOR PERSONAL USE AND NOT FOR RESALE, IS FRESH WHOLE MILK THAT HAS NOT BEEN PASTEURIZED. NEITHER THIS FARM NOR THE MILK SOLD BY THIS FARM HAS BEEN INSPECTED BY THE STATE OF MONTANA. THE CONSUMER ASSUMES LIABILITY FOR HEALTH ISSUES THAT MAY RESULT FROM THE CONSUMPTION OF THIS PRODUCT."

The last line of this label is misleading, at best because the House Struck the liability clause on the same page lines 21-22 because the liability protection was unconstitutional according to testimony from the Trial Lawyer's. A required label should not mislead the public into thinking that they do not have the right to legal recourse when they do.

Another high risk amendment can be found on page seven lines twenty three through twenty four.

"A grade A milk plant may sell raw milk directly at the point of production from a bulk milk tank to a consumer if the milk from the bulk milk tank meets the raw milk standards established in this chapter and rules of the department and is not resold by the consumer."

Please remember that the reason that there is a "small herd" requirement in the original bill is to lower risk. The current language for cow is a herd of seven or less. The above language would allow a grade A herd of 100 cows to sell raw milk. If one cow in that herd is sick then the pathogen will likely be in the bulk tank and contaminate all of the milk. Herd size is not a problem when the milk is pasteurized but is a large risk issue when it is consumed without pasteurization. Allowing large grade A farms to sell raw milk from bulk tanks simply too risky to allow.

Up until the early 1980's the sale of raw milk at the farm in Montana was legal but regulated. From June 25-August 3, 1980, an outbreak of Salmonella occurred in 105 persons who drank raw milk from a local Missoula dairy. At least 15 people were hospitalized. Diet histories of many of the infected persons were performed and raw milk was found to be the commonality. Unopened bottles of raw milk were analyzed and Salmonella was found in the samples. A report published by the Federal Center for Disease Control concluded: "The milk at this dairy caused a large outbreak of salmonellosis, although there were no obvious breaches in proper milking technique or dairy husbandry practice. Raw milk, even when strictly controlled or certified, may be contaminated" Subsequently the Legislature adopted legislation to ban all raw milk sales in Montana.

We are proud that Montana is one of eighteen states that does not allow the sale of raw milk. It shows that we understand the fact that raw milk is 150 times more likely to cause disease than pasteurized milk. We understand that it is children who are most likely to suffer lifelong impacts of disease or early death. It indicates that we are still willing to listen to experts in health like "the AMA reaffirms its policy that all milk sold for human consumption should be required to be pasteurized" and that the "AVMA supports laws requiring pasteurization of all milk to be sold..." and the American Academy of Pediatrics has officially stated that "Children...should never drink raw milk".

I have left pasteurized milk and cookies for all of you to enjoy during your hard work at this hearing. Let us suppose for a moment that that cup of milk is raw milk, falling under the small herd requirements of this bill which is arguably the most stringent raw milk sales option of the three allowed. There are 236 milliliters in a cup. The bill allows up to 25 coliform bacteria in a milliliter. I should also point out that many other states only allow 10 coliform bacteria per ml in raw milk.

Coliform bacteria come only from soil and feces. If that cup of milk was contaminated at 24 colonies per ml, just below the standard. There would be 5664 coliform bacteria from feces or soil in that milk. Now if you don't like milk you can get a drink of water from the fountain or cooler and be happy knowing that public water supplies such as these are monitored regularly for coliform and that if even one coliform is found to be present a "boil order" is issued and the supplier must notify all of it's customers and users.

The point here of course is that raw milk is riskier than almost anything else that we eat or drink. Would you drink milk if you knew that there were over 5,500 coliform bacteria present in a single cup and knowing that a few percent of milk cows carry e-coli 0157? Would you drink it if you knew that under the herd share amendment, there was no testing at all and that bacteria levels could be extreme?

Would you give it to your small child or grandchild? If your answer is no, then you should vote no on this bill.

This bill is unacceptably risky. There is clear evidence that allowing raw milk sales in other states have caused increased illness to those who consume raw milk. We know that raw milk is especially unsafe for small children and that the impacts to some are lifelong, costing the medical care system huge amounts of money. Protect Montana children. Vote no on House Bill 245.